Commonwealth of Kentucky Environmental and Public Protection Cabinet Department for Environmental Protection Division for Air Quality 803 Schenkel Lane Frankfort, Kentucky 40601 (502) 573-3382

AIR QUALITY PERMIT Issued under 401 KAR 52:040

Permittee Name: Graham Pallet Company, Inc.

Mailing Address: 3234 Celina Road

Tompkinsville, KY 42167

Source Name: Graham Pallet Company, Inc.

Mailing Address: 3234 Celina Road

Tompkinsville, KY 42167

Source Location: 3234 Celina Road

Permit: S-04-109 R2

Agency Interest: 3167

Activity: APE20080001

Review Type: Minor Source, Operating

Source ID: 21-171-00006

Regional Office: Bowling Green Regional Office

1508 Westen Avenue

Bowling Green, KY 42104

(270) 746-7475

County: Monroe

Application

Complete Date: June 19, 2007; July 15, 2008

Issuance Date: February 10, 2005

Revision Date: July 5, 2007; July 21, 2008

Expiration Date: February 10, 2015

John S. Lyons, Director Division for Air Quality Permit Number: S-04-109 R2 Page: 1 of 15

SECTION A - PERMIT AUTHORIZATION

Pursuant to a duly submitted application the Kentucky Division for Air Quality hereby authorizes the operation of the equipment described herein in accordance with the terms and conditions of this permit. This permit has been issued under the provisions of Kentucky Revised Statutes Chapter 224 and regulations promulgated pursuant thereto.

The permittee shall not construct, reconstruct, or modify any affected facilities without first submitting a complete application and receiving a permit for the planned activity from the permitting authority, except as provided in this permit or in 401 KAR 52:040, State-origin permits.

Issuance of this permit does not relieve the permittee from the responsibility of obtaining other permits, licenses, or approvals that may be required by the Cabinet or other federal, state, or local agencies.

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SECTION B - EMISSION POINTS, EMISSION UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS

Emissions Unit 01 (Area-1) Haul Roads and Yard Area

Description:

One main haul road and yard area Control Device: Water Spray

APPLICABLE REGULATIONS:

401 KAR 63:010, Fugitive emissions is applicable to each affected facility which emits or may emit fugitive emissions and is not elsewhere subject to an opacity standard within the administrative regulations of the Division for Air Quality.

1. **Operating Limitations:**

Pursuant to 401 KAR 63:010, Section 3, reasonable precautions shall be taken to prevent particulate matter from becoming airborne. Such reasonable precautions shall include, when applicable, but not be limited to the following:

- 1. Application and maintenance of asphalt, oil, water, or suitable chemicals on roads, material stockpiles, and other surfaces, which can create airborne dusts;
- 2. Covering, at all times when in motion, open bodied trucks transporting materials likely to become airborne;
- 3. The maintenance of paved roads in a clean condition; and
- 4. The prompt removal of earth or other material from a paved street, which earth or other material has been transported thereto by trucking or earth moving equipment or erosion by water.
- 5. Installation and use of compaction or other measures to suppress the dust emissions during handling.

2. Emission Limitations:

Pursuant to 401 KAR 63:010, Section 3, discharge of visible fugitive dust emissions beyond the property line is prohibited.

Compliance Demonstration Method:

Compliance by good operating procedures, see Subsection 1, Operating Limitations.

3. <u>Testing Requirements:</u>

None

4. Specific Monitoring Requirements:

None

5. Specific Recordkeeping Requirements:

None

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SECTION B - EMISSION POINTS, EMISSIONS UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS (CONTINUED)

6. **Specific Reporting Requirements:**

None

7. Specific Control Equipment Operating Conditions:

Pursuant to 401 KAR 52:055, the water spray shall be operated to maintain compliance with applicable requirements, in accordance with standard operating practices.

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SECTION B - EMISSION POINTS, EMISSIONS UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS (CONTINUED)

Emissions Unit 02 (EQPT3) - Pallet Mill Operations (Building Enclosure)

Description:

Cutting and trimming machines to size the green lumber for pallet production.

%75 of trimmed/chips wood are transferred to a wood chipper/shredder then are conveyed into truck load out carriers. %25 sawdust/chips produced from cutting machines are vented into cyclones with baghouse. Maximum continuous rating: 11.25 tons/hr (5625 BF/hr)

Emissions Control: Enclosure building and vented cutting machines into baghouse.

Installed Date: 1978

APPLICABLE REGULATIONS:

401 KAR 59:010 New Process Operations, applicable to emissions units installed after July 2, 1975.

1. **Operating Limitations:**

None

2. <u>Emission Limitations:</u>

- a. Pursuant to 401 KAR 59:010, Section 3(2), particulate emissions from the baghouse stack shall not exceed $[3.59(P)^{0.62}] = 16$ pound per hour based on a three-hour average where P is the average processing rate in tons per hour.
- b. Pursuant to 401 KAR 59:010, any continuous emissions into the open air shall not equal or exceed twenty percent (20%) opacity.

Compliance Demonstration Method:

Compliance with the allowable particulate standard can be demonstrated by using the following formula to determine the emissions in lb/hr unit:

 $Particulate\ emissions = \big[EF\ (lbs\ /\ ton) \big] * \big[P\ (tons\ /\ hr) \big]$

EF = 2 lbs/ton, provided by KYEIS

P = average processing rate

3. <u>Testing Requirements</u>:

None

4. **Specific Monitoring Requirements:**

- a. The permittee shall monitor the amount of wood material processed on a daily basis.
- b. The permittee shall perform a qualitative observation of the opacity emission from the stack on a weekly basis and maintain a log of the observations. If visible emissions from the stack are seen, then the opacity shall be determined by EPA reference Method 9 and, if the opacity reading is greater than 20 percent, then initiate an inspection of the equipment for any repairs.

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SECTION B - EMISSION POINTS, EMISSIONS UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS (CONTINUED)

5. **Specific Record Keeping Requirements:**

The permittee shall record and maintain records of the amount of wood processed and the hours of operations of the facility on a monthly basis.

6. Specific Reporting Requirements:

See Section C

7. Specific Control Equipment Operating Conditions:

Pursuant to 401 KAR 50:055, Section 2 (5), the enclosure vented into the baghouse used to control emissions shall be operated to maintain compliance with applicable requirements in accordance with manufacturer's specifications and/or standard operating practices.

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SECTION B - EMISSION POINTS, EMISSIONS UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS (CONTINUED)

Emission Unit 03 (EQPT4) Sawmill Rough Dimensional Operations

Description:

Debarking of round white oak logs and processing them into rough dimensional cants for pellet manufacturing.

Process Rate: 7.5 tons/hr (3750 BF/hr)

Controls: Enclosed Trailer.

APPLICABLE REGULATIONS:

401 KAR 59:010 New Process Operations, applicable to emissions units installed after July 2, 1975.

1. **Operating Limitations:**

None

2. <u>Emission Limitations:</u>

- a. Pursuant to 401 KAR 59:010, Section 3(2), particulate emissions from the stack shall not exceed $[3.59(P)^{0.62}] = 12.5$ pound per hour based on a three-hour average where P is the average processing rate in tons per hour.
- b. Pursuant to 401 KAR 59:010, any continuous emissions into the open air shall not equal or exceed twenty percent (20%) opacity.

Compliance Demonstration Method:

Compliance with the allowable particulate standard can be demonstrated by using the following formula to determine the emissions in unit of lb/hr:

Particulate emissions = [EF (lbs/ton)]*[P(tons/hr)]EF = 0.35 lbs/ton, provided by KYEIS P = average processing rate

3. Testing Requirements:

None

4. **Specific Monitoring Requirements:**

- a. The permittee shall monitor the amount of wood material processed on a daily basis.
- b. The permittee shall perform a qualitative visible observation of the opacity emission from the stack on a weekly basis and maintain a log of the observations. If visible emissions from the stack are seen, then the opacity shall be determined by EPA Reference Method 9 and, if the opacity reading is greater than 20 percent, then initiate an inspection of the equipment for any repairs.

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SECTION B - EMISSION POINTS, EMISSIONS UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS (CONTINUED)

5. **Specific Record Keeping Requirements:**

The permittee shall record and maintain records of the amount of wood processed and the hours of operations of the facility on a monthly basis.

6. Specific Reporting Requirements:

See Section C

7. Specific Control Equipment Operating Conditions:

Pursuant to 401 KAR 50:055, Section 2 (5), the enclosed trailer used to control emissions shall be operated to maintain compliance with applicable requirements in accordance with manufacturer's specifications and/or standard operating practices.

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SECTION B - EMISSION POINTS, EMISSIONS UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS (CONTINUED)

Emission Unit 04 (EQPT5 & 6) Three Propane Gas Fired Boilers for Pallets Heat Treat Kilns Operation

Description:

Two direct heat treating kilns #1 and #2 for sterilizing the pallets. Kiln #1 is heated by one propane gas burner rated at 1.85 MMBtu/hr;

Installed: June 2007

Kiln #2 is heated by two propane gas burners rated at 1.85 MMBtu/hr each;

Installed: June 2008

Kiln treating capacity: 275 pallets (average weight 50 lbs each) per hour

APPLICABLE REGULATIONS:

401 KAR 59:015, New heat exchangers, applicable to an emissions unit with a capacity of less than 250 mmBtu/hr which commenced on or after April 9, 1972.

1. **Operating Limitations:**

None

2. <u>Emission Limitations:</u>

- a. Pursuant to KAR 59:015, Section 4(1)(a), particulate emissions from each stack unit shall not exceed 0.56 lb/MMBtu.
- b. Pursuant to 401 KAR 59:015, Section 4(2), emissions shall not exceed twenty (20) percent opacity based on a six-minute average except:
 - 1. A maximum of forty (40) percent opacity shall be permissible for not more than six (6) consecutive minutes during in any sixty (60) consecutive minutes during cleaning the fire box or blowing soot.
 - 2. During building a new fire for the period required to bring the boiler up to operating conditions provided the method used is that recommended by the manufacturer and the time does not exceed the manufacturer's recommendations
- c. Pursuant to KAR 59:015, Section 5(1) (a), sulfur dioxide emissions shall not exceed 3.0 lb/MMBtu from each unit stack.

Compliance Demonstration Method:

These units are considered to be in compliance with the PM, SO₂, and opacity standards while burning propane gas

3. <u>Testing Requirements:</u>

None

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SECTION B - EMISSION POINTS, EMISSIONS UNITS, APPLICABLE REGULATIONS, AND OPERATING CONDITIONS (CONTINUED

4. Specific Monitoring Requirements:

The permittee shall monitor the amount of wood pallets processed on a daily basis

5. **Specific Record Keeping Requirements:**

The permittee shall record and maintain records of the amount of wood pallets processed and the hours of operations of the facility on a monthly basis.

Specific Reporting Requirements:

See Section C

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SECTION C - GENERAL CONDITIONS

1. Administrative Requirements

a. The permittee shall comply with all conditions of this permit. Noncompliance shall be a violation of 401 KAR 52:040, Section 3(1)(b) and is grounds for enforcement action including but not limited to the termination, revocation and reissuance, or revision of this permit.

- b. This permit shall remain in effect for a fixed term of ten (10) years following the original date of issue. Permit expiration shall terminate the source's right to operate unless a timely and complete renewal application has been submitted to the Division at least six months prior to the expiration date of the permit. Upon a timely and complete submittal, the authorization to operate within the terms and conditions of this permit, including any permit shield, shall remain in effect beyond the expiration date, until the renewal permit is issued or denied by the Division. [401 KAR 52:040, Section 15]
- c. Any condition or portion of this permit which becomes suspended or is ruled invalid as a result of any legal or other action shall not invalidate any other portion or condition of this permit [Section 1a-11 of the *Cabinet Provisions and Procedures for Issuing State-Origin Permits* incorporated by reference in 401 KAR 52:040 Section 23].
- d. Pursuant to materials incorporated by reference by 401 KAR 52:040, this permit may be revised, revoked, reopened, reissued, or terminated for cause. The filing of a request by the permittee for any permit revision, revocation, reissuance, or termination, or of a notification of a planned change or anticipated noncompliance shall not stay any permit condition [Section 1a-4, 5, of the *Cabinet Provisions and Procedures for Issuing State-Origin Permits* incorporated by reference in 401 KAR 52:040 Section 23].
- e. This permit does not convey property rights or exclusive privileges [Section 1a-8 of the *Cabinet Provisions and Procedures for Issuing State-Origin Permits* incorporated by reference in 401 KAR 52:040 Section 23].
- f. Nothing in this permit shall alter or affect the liability of the permittee for any violation of applicable requirements prior to or at the time of permit issuance [401 KAR 52:040 Section 11(3)].

All previously issued permits to this source at this location are hereby null and void.

2. Recordkeeping Requirements

a. Records of all required monitoring data and support information, including calibrations, maintenance records, and original strip chart recordings, and copies of all reports required by the Division for Air Quality, shall be retained by the permittee for a period of at least five years and shall be made available for inspection upon request by any duly authorized representative of the Division for Air Quality [401 KAR 52:040 Section 3(1)(f) and Section 1b-IV-2 of the *Cabinet Provisions and Procedures for Issuing State-Origin Permits* incorporated by reference in 401 KAR 52:040 Section 23].

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SECTION C - GENERAL CONDITIONS (CONTINUED)

b. The permittee shall perform compliance certification and recordkeeping sufficient to assure compliance with the terms and conditions of the permit. Documents, including reports, shall be certified by a responsible official pursuant to 401 KAR 52:040, Section 21.

3. Reporting Requirements

- a. (1) In accordance with the provisions of 401 KAR 50:055, Section 1, the permittee shall notify the Regional Office listed on the front of this permit concerning startups, shutdowns, or malfunctions as follows:
 - i. When emissions during any planned shutdowns and ensuing startups will exceed the standards, notification shall be made no later than three (3) days before the planned shutdown, or immediately following the decision to shut down, if the shutdown is due to events which could not have been foreseen three (3) days before the shutdown.
 - ii. When emissions due to malfunctions, unplanned shutdowns and ensuing startups are or may be in excess of the standards, notification shall be made as promptly as possible by telephone (or other electronic media) and shall be submitted in writing upon request.
 - (2) The permittee shall promptly report deviations from permit requirements including those attributed to upset conditions (other than emission exceedances covered by Reporting Requirement condition a.(1) above), the probable cause of the deviation, and corrective or preventive measures taken; to the Regional Office listed on the front of this permit within 30 days. Other deviations from permit requirements shall be included in the semiannual report [Section 1b-V-3 of the *Cabinet Provisions and Procedures for Issuing State-Origin Permits* incorporated by reference in 401 KAR 52:040 Section 23].
- b. The permittee shall furnish information requested by the Cabinet to determine if cause exists for modifying, revoking and reissuing, or terminating the permit; or to determine compliance with the permit [Section 1a-6 of the *Cabinet Provisions and Procedures for Issuing State-Origin Permits* incorporated by reference in 401 KAR 52:040 Section 23].
- c. Summary reports of monitoring required by this permit shall be submitted to the Regional Office listed on the front of this permit at least every six (6) months during the life of this permit. For emission units that were still under construction or which had not commenced operation at the end of the 6-month period covered by the report and are subject to monitoring requirements in this permit, the report shall indicate that no monitoring was performed during the previous six months because the emission unit was not in operation. The summary reports are due January 30th and July 30th of each year. All deviations from permit requirements shall be clearly identified in the reports. All reports shall be certified by a responsible official pursuant to 401 KAR 52:040, Section 21.

4. Inspections

In accordance with the requirements of 401 KAR 52:040, Section 3(1)(f) the permittee shall allow authorized representatives of the Cabinet to perform the following during reasonable times. Reasonable times are defined as during all hours of operation, during normal office hours; or during an emergency:

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SECTION C - GENERAL CONDITIONS (CONTINUED)

a. Enter upon the premises to inspect any facility, equipment (including air pollution control equipment), practice, or operation.

- b. To access and copy any records required by the permit.
- c. Inspect, at reasonable times, any facilities, equipment (including monitoring and pollution control equipment), practices, or operations required by the permit.
- d. Sample or monitor, at reasonable times, substances or parameters to assure compliance with the permit or any applicable requirements.

5. Emergencies/Enforcement Provisions

- a. The permittee shall not use as defense in an enforcement action, the contention that it would have been necessary to halt or reduce the permitted activity in order to maintain compliance [Section 1a-3 of the *Cabinet Provisions and Procedures for Issuing State-Origin Permits* incorporated by reference in 401 KAR 52:040 Section 23].
- b. An emergency shall constitute an affirmative defense to an action brought for the noncompliance with the technology-based emission limitations if the permittee demonstrates through properly signed contemporaneous operating logs or relevant evidence that:
 - (1) An emergency occurred and the permittee can identify the cause of the emergency;
 - (2) The permitted facility was at the time being properly operated;
 - (3) During an emergency, the permittee took all reasonable steps to minimize levels of emissions that exceeded the emissions standards or other requirements in the permit; and
 - (4) The permittee notified the Division as promptly as possible and submitted written notice of the emergency to the Division within two working days after the time when emission limitations were exceeded due to the emergency and included a description of the emergency, steps taken to mitigate emissions, and corrective actions taken.
- c. Emergency provisions listed in General Condition 5.b are in addition to any emergency or upset provision contained in an applicable requirement [401 KAR 52:040, Section 22(1)].
- d. In an enforcement proceeding, the permittee seeking to establish the occurrence of an emergency shall have the burden of proof. [401 KAR 52:040, Section 22(2)].

6. Compliance

- a. Periodic testing or instrumental or non-instrumental monitoring, which may consist of record keeping, shall be performed to the extent necessary to yield reliable data for purposes of demonstration of continuing compliance with the conditions of this permit. For the purpose of demonstration of continuing compliance, the following guidelines shall be followed:
 - (1) Pursuant to 401 KAR 50:055, General compliance requirements, Section 2(5), all air pollution control equipment and all pollution control measures proposed by the application of this permit shall be in place, properly maintained, and in operation at any time an affected facility for which the equipment and measures are designed is

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SECTION C - GENERAL CONDITIONS (CONTINUED)

operated, except as provided by 401 KAR 50:055, Section 1.

- (2) All the air pollution control systems shall be maintained regularly in accordance with good engineering practices and the recommendations of the respective manufacturers. A log shall be kept of all routine and nonroutine maintenance performed on each control device. Daily observations are required during daylight hours of all operations, control equipment and any visible emissions to determine whether conditions appear to be either normal or abnormal. If the operations, controls and/or emissions appear to be abnormal, the permittee must then comply with the requirements of Section C General Conditions, 3.a.(2), of this permit.
- (3) A log of the monthly raw material consumption and monthly production rates shall be kept available at the facility. Compliance with the emission limits may be demonstrated by computer program, spread sheets, calculations or performance tests as may be specified by the Division [401 KAR 50:055, Section 2].
- b. Pursuant to 401 KAR 52:040, Section 19, the permittee shall certify compliance with the terms and conditions contained in this permit by January 30th of each year, by completing and returning a Compliance Certification Form (DEP 7007CC) (or an approved alternative) to the Regional Office listed on the front of this permit in accordance with the following requirements:
 - (1) Identification of the term or condition;
 - (2) Compliance status of each term or condition of the permit;
 - (3) Whether compliance was continuous or intermittent;
 - (4) The method used for determining the compliance status for the source, currently and over the reporting period, and
 - (5) For an emissions unit that was still under construction or which has not commenced operation at the end of the 12-month period covered by the annual compliance certification, the permittee shall indicate that the unit is under construction and that compliance with any applicable requirements will be demonstrated within the timeframes specified in the permit.
 - (6) The certification shall be postmarked by January 30th of each year. Annual compliance certifications shall be mailed to the following addresses:

Division for Air Quality Bowling Green Regional Office 1508 Westen Avenue Bowling Green, KY 42104 Division for Air Quality Central Files 803 Schenkel Lane Frankfort, KY 40601-1403

- c. Permit Shield A permit shield shall not protect the owner or operator from enforcement actions for violating an applicable requirement prior to or at the time of permit issuance. Compliance with the conditions of this permit shall be considered compliance with all:
 - (1) Applicable requirements that are included and specifically identified in this permit; or
 - (2) Non-applicable requirements expressly identified in this permit [401 KAR 52:040, Section 11].

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SECTION C - GENERAL CONDITIONS (CONTINUED)

7. Construction Requirements:

Pursuant to a duly submitted application the Kentucky Division for Air Quality hereby authorizes the construction of the equipment described herein, emission points EU 04 (Boilers to Kiln #2) in accordance with the terms and conditions of this permit.

- a. Pursuant to 401 KAR 52:040, Section 12(3), unless construction is commenced on or before 18 months after the date of issuance of this permit, or if construction is commenced and then stopped for any consecutive period of 18 months or more, or is not completed within a reasonable timeframe, then the construction and operating authority granted by this permit for those affected facilities for which construction was not completed shall immediately become invalid. Upon a written request, the Cabinet may extend these time periods if the source shows good cause.
- b. Pursuant to 401 KAR 52:040, Section 12(4)(a) and 401 KAR 59:005, General provisions, Section 3(1), within 30 days following construction commencement, within 15 days following start-up and attainment of maximum production rate, or within 15 days following the issuance date of this permit, whichever is later, the owner and/or operator of the affected facilities specified on this permit shall furnish to the Regional Office listed on the front of this permit, with a copy to the Division's Frankfort Central Office, the following:
 - (1) Date when construction commenced.
 - (2) Start-up date of each of the affected facilities listed on this permit.
 - (3) Date when maximum production rate was achieved.
- c. Pursuant to 401 KAR 59:005, General provisions, Section 2(1), this permit shall allow operation for (*performance testing and/or compliance demonstration*) of the affected facilities listed herein. However, within 60 days after the issuance date of this permit or the date of achieving the maximum production rate at which the affected facilities will be operated, whichever is later, but no later than 180 days after initial start-up of such facilities, or the issuance date of this permit, whichever is later, the owner or operator shall *demonstrate compliance to a duly authorized representative of the Division*.
- d. Operation of the affected facilities authorized by this permit shall not commence until compliance with applicable standards specified herein has been demonstrated in accordance with the requirements of 401 KAR 52:040, Section 12(4)(b). Until compliance is demonstrated, the source may only operate for the purpose of demonstrating compliance.

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SECTION D - INSIGNIFICANT ACTIVITIES

The following listed activities have been determined to be insignificant activities for this source pursuant to 401 KAR 52:040, Section 6. Although these activities are designated as insignificant the permittee must comply with the applicable regulation. Process and emission control equipment at each insignificant activity subject to an opacity standard shall be inspected monthly and a qualitative visible emissions evaluation made. Results of the inspection, evaluation, and any corrective action shall be recorded in a log.

Description

Generally Applicable Regulation

None